

# The Greenville Storm

Summer 2019

## Improving Your Yard to Handle Heavy Rainfall

Developed land handles heavy rainfall differently than undeveloped areas. In undeveloped areas, tree canopies, plant roots and healthy soil absorb up to 90% of rain that falls. In developed areas this figure drops as low as 10% due to impervious surfaces such as roadways, rooftops and parking lots. In addition to increased rainfall amounts, growth and development directly impact the amount of storm water runoff by increasing erosion, scouring streambanks, declining water quality and flooding.

So, how can we help reduce the amount of runoff from increased paving and piping?

- **Plant Native Species:** Native trees and plants slow down, spread out and absorb rainfall. These trees and plants also trap sediment and pollution, reduce the impact of raindrops on the soil and store rainwater. Leaves from trees breakdown and increase the organic matter in the soil, thus increasing the soil's water holding ability.
- **Create a Buffer Strip:** Planting native species as a buffer along a stream, road, farm field, ditch or property line keeps soil and nutrients out of the water and reduces mowing. Roots also hold the soil in place and reduce bank erosion.
- **Store Rainwater:** Using rain barrels and rain gardens help hold rainfall. Rain gardens are designed to allow rainfall to seep into the ground, absorbing 30-40% more rainfall than a standard lawn. Rain gardens are also a way to plant a wildlife or pollinator habitat and reduce mowing. Rain barrels help save water, reduce storm water pollution and alleviate flooding.
- **Healthy Soil:** One of the main jobs of soil is to store and filter water. Healthy soil contains 50% pore space. You can increase your soil health by: mowing high (3.5-4 inches), using mulch in flower beds and around trees, mulching leaves in the fall, and adding compost to soil.



This newsletter is for residents of the city of Greenville dedicated to reducing storm water impacts on Greenville Creek.

